MEMORANDUM

DATE: 7/20/2009

TO: Nick Hetrick, Arcata FWO

FROM: Kimberly True

CA-NV Fish Health Center

(530) 356-4271

Kimberly_True@fws.gov

SUBJECT: 2009 Klamath River Salmonid Health Monitoring

As a component of Klamath River fish health assessment, the California-Nevada Fish Health Center is examining juvenile Klamath River Chinook Salmon to monitor the incidence of *Ceratomyxa shasta* and *Parvicapsula minibicornis* infection. Fish are collected by biologists with the Karuk Tribe, Yurok Tribe, Hoopa Tribe and US Fish and Wildlife Service. The fish health center is providing laboratory support for the project. Sampling began the week of April 20 and is planned to continue through early August 2009.

Pathogen testing by QPCR has been performed for fish collected through 3 July and is summarized in Figure 1-4. *Ceratomyxa shasta* has been detected in 50% (319/636) and *Parvicapsula* minibicornis has been detected in 74% (471/636) of Klamath Chinook juveniles tested to date. The next update of this data will be available after August 15.

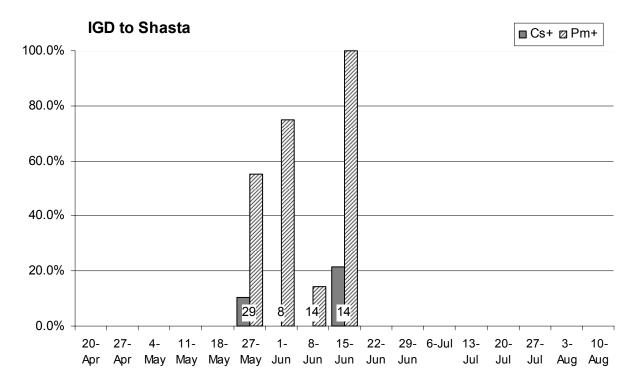


Figure 1. Weekly incidence of *Ceratomyxa shasta* and *Parvicapsula minibicornis* infection in juvenile Klamath River Chinook salmon captured in K5 reach on the Klamath River (Iron Gate Dam to Shasta River). Sample numbers collected each week are displayed at the bottom of each column. All data is preliminary and subject to revision.

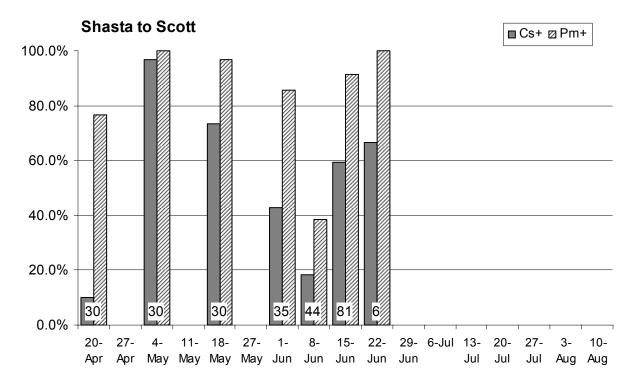


Figure 2. Weekly incidence of *Ceratomyxa shasta* and *Parvicapsula minibicornis* infection in juvenile Klamath River Chinook salmon captured in K4 reach on the Klamath River (Shasta to Scott River). Sample numbers collected each week are displayed at the bottom of each column. All data is preliminary and subject to revision.

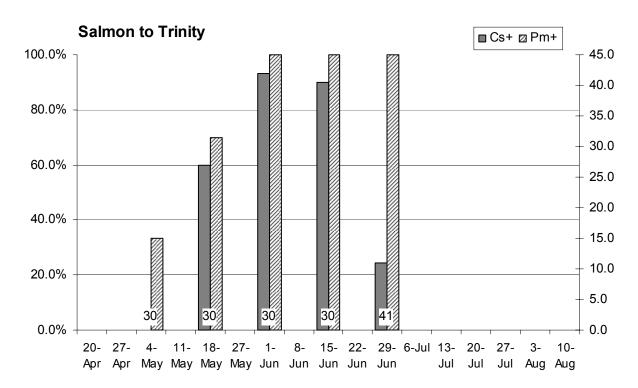


Figure 3. Weekly incidence of *Ceratomyxa shasta* and *Parvicapsula minibicornis* infection in juvenile Klamath River Chinook salmon captured in K2 reach on the Klamath River (Salmon River to Trinity River confluence). Sample numbers collected each week are displayed at the bottom of each column. All data is preliminary and subject to revision.

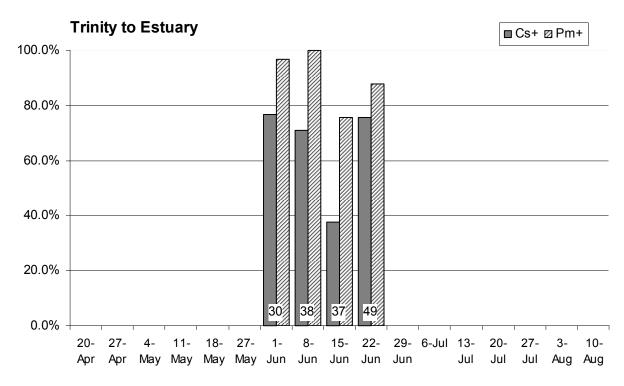


Figure 4. Weekly incidence of *Ceratomyxa shasta* and *Parvicapsula minibicornis* infection in juvenile Klamath River Chinook salmon captured in K1 reach on the Klamath River (Trinity River confluence to Estuary). Sample numbers collected each week are displayed at the bottom of each column. All data is preliminary and subject to revision.